

HW answers:

16) The events are not independent. Handedness can be genetic, so a brother and sister may be left handed may not be indep.

19) (a) $1 - (0.17 + 0.07 + 0.04) = 0.72$

(b) $0.17 + 0.72 = 0.89$

(c) 0.28

21) (a) $P(\text{none n none}) = (0.72)(0.72) = 0.5184$

(b) $P(\text{repair n repair}) = (0.28)(0.28) = 0.0784$

(c) $1 - P(\text{none n none}) = 1 - 0.5184 = 0.4816$

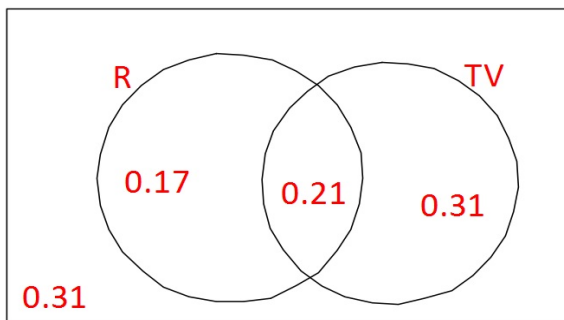
23) (a) repairs must be independent of one another in the 2 cars

(b) maybe!

$$P(R) = 0.38 \quad \#3$$

$$P(TV) = 0.52$$

$$*P(TV \cap R) = 0.21$$



$$\textcircled{a} P(TV \cap R^c) = 0.31$$

$$\textcircled{b} P(TV \cup R) - P(TV \cap R)$$

$$0.17 + 0.31$$

$$\textcircled{0.48}$$

$$\textcircled{c} P(TV^c \cap R^c) = \textcircled{0.31}$$

$$P(M) = 0.72 \quad \#4$$

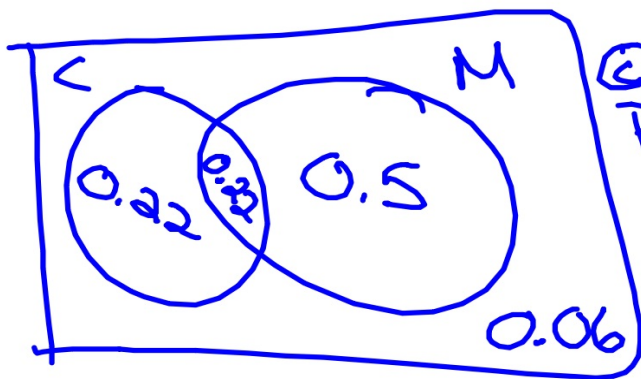
$$P(C) = 0.44$$

$$P(C \cap M) = 0.22$$

$$a) P(M^c \cap C^c) = 0.06$$

$$b) P(M \cap C^c) = 0.50$$

$$c) P(M \cup C) = 0.94$$



TODAY → PRACTICE

TOM → TREE DIAGRAMS

FRI → QUIZ 14 & 15